#### DEPARTMENT OF TRANSPORTATION

DIVISION OF ENGINEERING SERVICES Office of Structural Materials

Quality Assurance and Source Inspection

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Contract #: 04-0120F4

Cty: SF/ALA Rte: 80 PM: 13.2/13.9

File #: 69.28

# WELDING INSPECTION REPORT

Resident Engineer: Pursell, Gary **Report No:** WIR-006120 Address: 333 Burma Road **Date Inspected:** 28-Mar-2009

City: Oakland, CA 94607

**OSM Arrival Time:** 1830 **Project Name:** SAS Superstructure **OSM Departure Time:** 630 **Prime Contractor:** American Bridge/Fluor Enterprises, a JV

Contractor: Zhenhua Port Machinery Company, Ltd (ZPMC), Changxing Island **Location:** Shanghai, China

Wuzhi Cheng and Chen Likun **CWI Name: CWI Present:** Yes No **Inspected CWI report:** Yes N/A **Rod Oven in Use:** Yes No No N/A N/A **Electrode to specification:** Yes No Weld Procedures Followed: Yes No N/A N/A **Qualified Welders:** Yes No **Verified Joint Fit-up:** Yes No N/A N/A Yes N/A **Approved Drawings:** Yes No **Approved WPS:** No Yes No N/A **Delayed / Cancelled:** 

34-0006 **Bridge No: Component:** Tower and OBG

### **Summary of Items Observed:**

On this day CALTRANS OSM Quality Assurance Inspector (QA) Joe Alaniz was present during the times noted above for observations relative to the fabrication of the SAS Superstructure being performed by Zhenhua Port Machinery Company (ZPMC) at Changxing Island in Shanghai, China. QA observed and/or found the following:

This QA Inspector observed the following work in progress:

#### OBW3

ZPMC's qualified welding personnel's identified are Mr. Lu Yangyuan (202841) and Mr. Xin Meng (053742) perform FCAW welding on weld joint identified as OBW3-004 and 002. ZPMC QC identified Mr. Wuzhi Cheng was present to monitor the welding process. The welding parameters as measured using QC's calibrated instruments appeared to be in general compliance with WPS-B-P-2233-B-U2-F.

ZPMC's qualified welding personnel identified is Mr. Dai Lu (048659) perform SMAW welding on weld joint identified as OBW3-001. ZPMC QC identified Mr. Wuzhi Cheng was present to monitor the welding process. The welding parameters as measured using QC's calibrated instruments appeared to be in general compliance with WPS-B-P-2112-FCM.

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Bay 10

ZPMC's qualified welding personnel's are identified as Mr. Jiang Jinlong (040239), Mr. Zhang Jinlong (057220) and Mr. Fan Chunlei (040491) perform SMAW welding on weld joint identified as NSD1-A128B/H-113B, 3B and NSD1-A166E/J-52B, 32A. ZPMC QC identified Mr. Chen Likun was present to monitor the welding process. The welding parameters as measured using QC's calibrated instruments appeared to be in general compliance with WPS-B-T-2214-C-U2.

ZPMC's qualified welding personnel's are identified as Mr. Jian Zhou (040261), Mr. Tao Qian (00457) Mr. Li Haishan (048784), Mr. Zhang Yiqui (048027) and Zhu Zhongyum (057194) perform FCAW welding on weld joint identified as SSD1-TL5-B/L-1A and SSD1-FASA3-1E/E-26, 27, 58 and 59. ZPMC QC identified Mr. Li Peng Fei was present to monitor the welding process. The welding parameters as measured using QC's calibrated instruments appeared to be in general compliance with WPS-B-T-2332-TC-P5-F-1.

Bay 11

ZPMC's welding personnel's are identified as Mrs. Wu Aixiang (044560) and Mrs. Li Xiaoqing (040772) performing groove welding of weld joint ESD1-FCSA3-2B/C-65B and ESD1-FCSA3-2B/C-66B. The personnel were observed welding in the 1G (flat) position utilizing a Submerged Arc Welding (SAW) process. ZPMC QC identified Mr. Li Ming and was present to monitor the welding process. The welding parameters as measured using QC's calibrated instruments appeared to be in general compliance with WPS-B-T-2221-B-U3C-S-1.

ZPMC's qualified welding personnel's are identified as Mr. Yang Zhaoyan (047470), Mr. Xie Zhongcheng (058772), Mr. Yan Zaihua (040669) and Mr. Yin Guoqiang (058772) perform FCAW welding on weld joint identified as ND1-A468-18M-1-1A, 6A, 28B, NDI-A476-53M-1-3A, 29A, 14B and ESD1-TLB/L-4A/B. ZPMC's QC identified Mr. Yu Dong Ping and Mr. Li Ming was present to monitor the welding process. The welding parameters as measured using QC's calibrated instruments appeared to be in general compliance with WPS-B-T-3212-TC-U5b-1, WPS-B-T-2212-TC-U5b-1 and WPS-345-FCAW-1G (1F)-Repair.

Bay 5

This QA Inspector observed ZPMC welder Mao Shuai (217294) welding in the 4G position on weld joint CB201G-148/166 in OBG Assembly Shop (Bay 5). Noted welder is qualified in the 3G position. QA Inspector issued an incident report on this date for the welding observed.

Unless otherwise noted, all work observed on this date appeared to generally comply with applicable contract documents.

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# **Summary of Conversations:**

Only general conversation was held between QA and QC concerning this project.

#### **Comments**

This report is for the purpose of determining conformance with the contract documents and is not for the purpose of making repair or fit for purpose recommendations. Should you require recommendations concerning repairs or remedial efforts please contact Eric Tsang (134-8257-0045), who represents the Office of Structural Materials for your project.

Inspected By:	Alaniz,Joe	Quality Assurance Inspector
Reviewed By:	Clifford,William	QA Reviewer